

ABSTRACT

A method for producing a biaxially oriented, heat set plastic container, including the steps of providing a plastic preform within a mold cavity; expanding and stretching the plastic preform into conformity with the surfaces defining the mold cavity to form a biaxially oriented plastic container; inducing crystallinity in the plastic container by using convection heat transfer to heat a surface of the plastic container to a temperature of at least 120°C; and removing the plastic container from the mold cavity. The PET containers produced by the method have an average sidewall crystallinity greater than about 30%, which allows the PET container to maintain its material integrity during any subsequent pasteurization or retort process of the contents in the PET container, and during shipment of the PET container.